

IN THE CLAIMS:

Amendments to the Claims

Please amend claim 37 as shown below, please cancel claims 43 and 59 without prejudice or disclaimer of the subject matter thereof, and add the new claims as shown below.

Listing of Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Claims 1-36 (canceled)

37. (previously presented) A component, comprising a part having a concave and convex configuration for one of ~~the~~ enabling one of light convergence, light diffusion and light diffraction, being formed as a reflective film, and wherein said concave and convex configuration has a tangential angle defined at no greater than 23 degrees relative to a horizontal face.

38. (previously presented) A component, comprising a part having a concave and convex configuration for one of enabling one of light convergence, light diffusion and light diffraction, and at which a reflective film is formed, and wherein said concave and convex configuration has a tangential angle defined at no greater than 23 degrees relative to a horizontal face, and is formed by one of transferring with a die formed by cutting and by using a transfer master pattern formed with a die.

39. (previously presented) A component as defined in Claim 38, wherein said die has a concave and convex configuration in which a tangential angle is defined at no more than 23 degrees relative to a horizontal face.

40. (previously presented) A component as defined in Claim 39, wherein said die is formed by a cutting tool fixed to a cutting machine with an angle defined at edge angle no greater than $\theta 2 \pm 3$ degrees in the case where a tooth face of said cutting tool extends vertically with respect to said transfer master pattern.

41. (previously presented) A component as defined in Claim 39, wherein said die is formed by a cutting tool having an edge angle $\theta 2$ defined at no greater than 20 degrees and being fixed to a cutting machine.

42. (previously presented) A component as defined in Claim 39, wherein said concave and convex configuration is formed by a cutting tool having a shape of a nose profile at a tip end of a sectional form of said concave and convex configuration, being fixed to a cutting machine with a tooth face of said cutting tool being at no greater than 23 degrees to a transfer master pattern, and said concave and convex configuration being cut by controlling a moving locus of said tip end.

Claim 43 (canceled)

44. (previously presented) A method of forming a die comprises:
a step of fixing a cutting tool to a cutting machine with an angle defined at edge angle of no greater than $\theta 2 \pm 3$ degrees or below in the case where a tooth face of said cutting tool stands vertical to a horizontal face; and

a step of cutting said die so as to make a concave and convex configuration having a tangential angle defined at no greater than 23 degrees relative to the horizontal face.

45. (previously presented) A method of forming a die as defined in claim 44, wherein in said step of cutting said die, said cutting tool is moved in a Z direction and said die is moved in X and Y directions so as to be cut.

46. (previously presented) A method of forming a die as defined in claim 44, wherein in said step of cutting said die, said cutting tool is moved in Z direction by use of at least one of a piezoelectric element, a magnetostrictive element and an ultrasonic wave oscillator as a drive source.

47. (previously presented) A method of forming a die having a concave and convex configuration comprises:

a step of fixing a cutting tool to a cutting machine with an angle defined at edge angle of no greater than $\theta 2 \pm 3$ degrees or below in the case where a tooth face of said cutting tool extends vertically with respect to a horizontal face; and

a step of cutting said die so as to make said concave and convex configuration.

48. (previously presented) A method of forming a die as defined in claim 47, wherein in said step of cutting said die, said cutting tool is moved in a Z direction and said die is moved in X and Y directions so as to be cut.

49. (previously presented) A method of forming a die as defined in claim 47, wherein in said step of cutting said die, said cutting tool is moved in a Z direction by use of at least one of a piezoelectric element, a magnetostrictive element and an ultrasonic wave oscillator as a drive source.

50. (previously presented) A method of forming a die having a concave and convex configuration comprises:

a step of fixing a cutting tool having an edge angle θ_2 defined at no greater than 20 degrees to a cutting machine; and

a step of cutting said die so as to make said concave and convex configuration.

51. (previously presented) A method of forming a die as defined in claim 50, wherein in said step of cutting said die, said cutting tool is moved in a Z direction and said die is moved in X and Y directions so as to be cut.

52. (previously presented) A method of forming a die as defined in claim 50, wherein in said step of cutting said die, said cutting tool is moved in Z direction by use of at least one of a piezoelectric element, a magnetostrictive element and an ultrasonic wave oscillator as a drive source.

53. (previously presented) A method of forming a die for transferring a concave and convex configuration comprises:

a step of fixing a cutting tool having a shape of a nose profile at a tip end of a sectional form of said concave and convex configuration to a cutting machine with a tooth face of a cutting tool being at no greater than 23 degrees to a transfer master pattern; and

a step of cutting the die so as to make said concave and convex configuration by controlling a moving locus of said tip end.

54. (previously presented) A method of forming a die as defined in claim 53, wherein in said step of cutting said die, said cutting tool is moved in a Z direction and said die is moved in X and Y directions so as to be cut.

55. (previously presented) A method of forming a die as defined in claim 53, wherein in said step of cutting said die, said cutting tool is moved in Z direction by use of at least one of a piezoelectric element, a magnetostrictive element and an ultrasonic wave oscillator as a drive source.

56. (previously presented) A method of forming a die for transferring a concave and convex configuration comprises:

a step of fixing a cutting tool to a cutting machine with an angle defined at edge angle of no greater than $\theta 2 \pm 3$ degrees in the case where a tooth face of said cutting tool extends vertically with respect to a transfer master pattern; and

a step of cutting said die so as to make said concave and convex configuration.

57. (previously presented) A method of forming a die as defined in claim 56, wherein in said step of cutting said die, said cutting tool is moved in a Z direction and said die is moved in X and Y directions so as to be cut.

58. (previously presented) A method of forming a die as defined in claim 56, wherein in said step of cutting said die, said cutting tool is moved in a Z direction by use of at least one of a piezoelectric element, a magnetostrictive element and an ultrasonic wave oscillator as a drive source.

Claim 59 (canceled)

60. (new) A component as defined in Claim 37, wherein said concave and convex configuration is formed over substantially an entire surface and has a convex configuration which is formed by a combination of outlines of spheres or outlines of symmetrical non-spheres.

61. (new) A component as defined in Claim 37, wherein said concave and convex configuration is formed over substantially an entire surface and has a convex configuration which is formed by a combination of spheres or symmetrical non-spheres and a plane surface.